

May 10, 2007

Errata Document for CY2305C, CY2309C Zero Delay Buffers

This document describes the errata for the Zero Delay Clock Buffers, CY2305C and CY2309C. Details include errata trigger conditions, scope of impact, available workarounds, and silicon revision applicability. Compare this document to the device's data sheet for a complete functional description.

Contact your local Cypress Sales Representative if you have questions.

Part Numbers Affected

Part Number	Temperature Grades	Packages
CY2305C-1	all	all
CY2305C-1H	all	all
CY2309C-1	all	all
CY2309C-1H	all	all

Zero Delay Buffer Qualification Status

In Production

Zero Delay Buffer Errata Summary

The following table defines the errata applicability to available Zero Delay Buffer family devices.

Note Errata titles are hyperlinked. Click on the table item entry to jump to its description.

Items	Part Numbers	Fix Status
[1] Possible increased power down current	All	Will be corrected in the next silicon revision. The errata is forecast to be corrected for all devices dated October 2007 and later.

1. Possible increased power down current

- **PROBLEM DEFINITION**

When the device is in the power down state, an unbonded pad on the die is allowed to float. Because of this, power down current may exceed the data sheet limit.

While high current draw is theoretically possible any time during power down, it has only been observed as a transient occurrence shortly after the device enters power down. Steady-state current has always been observed to be within data sheet limits.

- **PARAMETERS AFFECTED**

Parameter	Temperature Range	Data Sheet Maximum	Actual Maximum
IDD (PD Mode)	Commercial	12 µA	3.5 mA
	Industrial	25 µA	3.5 mA

- **TRIGGER CONDITION(S)**

None.

• SCOPE OF IMPACT

Possible increased power consumption when in the power down state (that is, when the reference clock is static).

• WORKAROUND

None.

• FIX STATUS

The silicon will be revised to correct this errata. The errata is forecast to be corrected for all devices dated October 2007 and later.

References

[1] Document # 38-07672, CY2305C and CY2309C Zero Delay Buffer

**Document History Page**

Document Title: Errata Document for CY2305C, CY2309C Zero Delay Buffers
Document Number: 001-15585

REV.	ECN NO.	Issue Date	Orig. of Change	Description of Change
**	1058882	See ECN	KVM/ KKVTMP	Original release of spec.